

METHOD FOR OPTICAL MODULE PACKAGING OF FLIP CHIP BONDING

RELATED APPLICATION

[0001] The application is a divisional of U.S. Patent Application, Serial No. 10/185,103, filed June 27, 2002, *now Patent No. 6,707,167* by Applicants, Jong-Tae Moon and Yong-Sung Eom, and entitled "Optical Module Package of Flip Chip Bonding (As Amended)."

BACKGROUND

Field of the Invention

[0002] The present invention relates to an optical module package and a packaging method thereof, and more particularly, to a flip-chip-bonded optical module package and a packaging method thereof.

Description of the Related Art

[0003] In most cases, if electric signals of an optical device are allowed to be transmitted to the outside of the optical device by a conventional wire-bonding method and a chip of the optical device operates at a high speed of no less than 20 Gbps, electric parasitic components increase and the chip cannot show its desired speed. Accordingly, a flip chip bonding method capable of minimizing the distance between the chip of an optical device and a substrate, which are electrically connected to each other, must be used to minimize parasitic components between the chip of an optical device and the substrate.

[0004] FIG. 1 is a flowchart illustrating a conventional method of packaging an optical module using flip chip bonding. Referring to FIG. 1, a chip of an optical device is manufactured in step 10. Next, solder balls, which transmit electric signals to the outside of the optical device chip, are deposited on a silicon wafer in step 12. Next, the optical device chip is bonded to the silicon wafer by flip chip bonding in step 14.